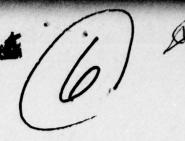


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Report SCS-LS-004

Life Stress, Organizational Stress, and Job Satisfaction

Irwin G. Sarason and James H. Johnson Department of Psychology University of Washington Seattle, Washington 98195



March 15, 1978

Technical Report

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> levels of satisfaction. The implications of these findings for assessing organizational stress and for the prediction of attrition from organizations are discussed. recall erson dragnizational otress, and Job entrational Effectiveness Research Program (co of havel Pasearch (Code 452) Ite Section Section [

In recent years numerous studies have investigated the relationship between changes experienced by persons in their daily lives and physical and psychological difficulties. These studies have found life stress, defined in terms of reported life changes, to be related to such medical indices as myocardial infarction, sudden cardiac death, major and minor health changes as well as to psychological conditions such as anxiety, depression, neuroticism, and social maladjustment. In addition, life stress has been reported to correlate with such performance measures as academic achievement and job performance among teachers. A general review of the literature on life stress has recently been provided by Rabkin and Struening (1976).

Most of the research on life stress has involved assessment of changes experienced in the personal lives of individuals and several instruments have been developed for this purpose, the most widely used being the Schedule of Recent Experience (Holmes and Rahe, 1967). This measure requires respondents to indicate which of 43 events they have experienced in the recent past. Values termed life change units, which are purported to reflect the degree of social readjustment necessitated by experiencing each of these events, are then summed to yield a total life stress score. An alternative measure, employing a different format, has recently been developed by Sarason, Johnson and Siegel (1977). This measure, The Life Experiences Survey, differs from the Holmes and Rahe scale in that it allows for separate assessment of positive and negative life changes and for individualized ratings of the impact of events. Like the Holmes and Rahe measure the Life Experiences Survey has been found to correlate with such dependent measures as indices of health status and adjustment with negative life changes (e.g. death in the family) exerting a much greater impact than positive ones (e.g. getting married).

It is possible that life changes are also related to work situation variables such as job satisfaction and performance. It may, however, be necessary to devise a measure specifically designed to assess those types of changes - particularly organizational ones - experienced in the work environment. Logically, organizational stress merits assessment along with the stresses experienced in our personal lives.

This article describes a study of the relationship between life stress and job satisfaction among naval personnel. A measure, the Organizational Change Inventory, specifically designed to assess life changes in the work situation was also developed for use in this study. By using both the Life Experiences Survey and the Organizational Change Inventory it was possible to determine the relationship between changes experienced in one's personal life and those experienced in the work situation on the one hand, and job satisfaction, on the other.

Method

Subjects

The subjects were 44 male naval personnel stationed at the Sand Point Naval Activities Support Station in Seattle, Washington. Subjects ranged in age from 19 to 48 (mean age 29.7). The average time spent in the military was 7.71 years.

Materials

Test instruments included the Life Experience Survey (Sarason, Johnson and Siegel, 1977), the Organizational Change Inventory (OCI) and the Job Descriptive Index (Smith, Kendall, and Hulin, 1969).

The Life Experiences Survey. The LES is a measure of life stress which assesses degree of change resulting from events experienced in one's personal life (e.g. marriage, divorce, personal illness, death of family member, pregnancy, outstanding personal achievement, etc.). Respondents are asked (1) to indicate

events experienced during the past year, (2) whether they perceive the events as desirable or undesirable, and (3) the impact each event exerted on their lives. By summing the impact ratings of events rated as desirable and those rated as undesirable it is possible to obtain separate positive and negative life change scores. Research with this measure has suggested that it is correlated with a number of stress related variables including anxiety, depression, neuroticism, social malajustment, and academic performance. Although previous studies provide support for the validity of the LES it is important to note a point mentioned above: negative life changes are more consistently correlated with dependent variables than are positive changes.

<u>Organizational Change Inventory.</u> This measure was designed in a manner similar to the Life Experiences Survey. It consists of a list of 30 items relating to changes that might be experienced within the naval environment. Examples of such changes include; new superior officer, promotion, change in work schedule, deployment, injury to fellow worker, transfer, conflict with fellow worker, new commanding officer, etc. As with the LES, respondents are asked to indicate which of these events (30 in number) they have experienced during the past year and whether they perceived the events as positive or negative. Respondents are asked to rate each of the events as to the degree of impact the event had on them. These ratings are on a scale of -3 to +3, with a -3 indicating a negative event that had a very great impact and +3 indicating a positive event which had a very great impact. By summing the impact ratings of positive and negative events it is possible to obtain measures reflecting the extent of desirable and undesirable change associated with the working environment.

The Job Descriptive Index. The Job Descriptive Index (JDI) is a measure of job satisfaction developed by Smith, Kendall and Hulin (1969). It consists of a

number of adjectives descriptive of the people one works with including one's supervisor, the nature of the work itself, the level of pay received and opportunities for promotion. In responding to this measure, subjects are requested to indicate whether these adjectives are or are not descriptive of their job. In the present study, they responded by indicating whether such adjectives were descriptive of the Navy. From this scale it was possible to derive a total satisfaction score as well as subscale scores reflecting levels of satisfaction with a) the type of work involved, b) supervisors, c) people worked with, d) pay and e) opportunities for promotion.

Procedure

After obtaining the measures described above, Pearson product-moment correlations were computed to determine the relationship between life changes (positive and negative) experienced in subjects' personal lives and organizational changes (positive and negative) experienced in their work and job satisfaction measures.

Results and Discussion

The correlations between positive and negative life change scores derived from the Life Experience Survey and measures of job satisfaction, as assessed by the JDI, are presented in Table 1. Here it maybe seen that life changes

Insert Table 1 about here

as indexed by the LES are significantly related to job satisfaction. This is indicated by the significant correlations between negative life change scores and measures of satisfaction with the nature of work, supervision, and pay as well as by a significant correlation between negative life change and overall level of job satisfaction. Thus, it would appear that changes occurring in ones

personal life are, in fact, related to degree of job satisfaction. It would, appear, however, that satisfaction is primarily related to negative change although positive change was found to be related to two of the JDI subscales (pay, promotion).

Correlations between the Organizational Change Inventory (OCI) and indices of job satisfaction are presented in Table 2. Here it may be seen that both positive and negative change were related to certain aspects of job satisfaction.

Insert Table 2 about here

For example, both positive and negative changes were correlated with satisfaction with type of work, and with the type of people encountered in the work situation as well as with overall level of job satisfaction. Positive and negative changes, however, correlated in <u>opposite directions</u> with these variables, positive change being associated with increased satisfaction and negative change being associated with decreased satisfaction.

A similar pattern of relationships between organizational change and job satisfaction has also been found in a separate study of Naval reserve personnel. Employing a sample (N = 28) of reservist the OCI positive change score correlated significantly with total JDI satisfaction scores (r = .38, p < .03), while the negative change score correlated significantly, but in the opposite direction with this same measure (r = -.40, p < .02).

Taken together, these results suggest that changes experienced in one's personal life as well as those experienced in the work situation are related to job satisfaction, in the present case degree of satisfaction with a Naval assignment. Further studies are needed to relate measures of life stress and organizational stress to organizational effectiveness as well as to job satis-

faction.

The fact that the Organizational Change Inventory was found to be predictive of job satisfaction in the present study seems to provide support for conceptualizing organizational stress in terms of changes experienced within the working environment, and suggests that the OCI may be useful as a research tool in the investigation of organizational stress.

Finally, it might be noted that one area of inquiry suggested by the data reported here, linking stressors to job satisfaction, relates to attrition among personnel in organizations. Since subjects in this study were naval personnel it is reasonable to assume that personal and organizational stressors may be useful predictors of attrition occurring at various points during the enlistment term. Research related to this issue would seem to be particularly worthwhile.

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Table 1
Correlations Between Measures of Life Stress and Job Satisfaction

Life Stress	Job Satisfaction Measure							
Measure	Work	Supervision	People	Pay	Promotion	Total		
Positive Change	.05	.05	16	27*	42**	17		
Negative Change	37**	31*	24	31*	19	34*		

^{*} p <.05

^{**} p <.01

Table 2
Correlations between Organizational Stress and Job Satisfaction

Organizational Stress	Job Satisfaction Measure						
Measure	Work	Supervision	People	Pay	Promotion	Total	
Positive Change	.37**	.14	.29*	.10	.18	.28*	
Negative Change	31*	25	35**	18	17	36**	

^{* &}lt;u>p</u>∠.05

^{**} p<.01

Footnotes

This research was funded by the Organizational Effectiveness Research Program, Office Of Naval Research (code 452), Under Contract No. NOO014-75-C-0905, NR 170-804. We are extremely indebted to Capt. Warren H. Lockwood of the Sand Point Naval Activities Support Station, U.S. Navy, for his many helpful suggestions and support of this research. The authors also wish to thank Richard Carroll, Irene Pech, and Dr. Judith M. Siegel who assisted in data collection and data analysis.

 $^{^2}$ Copies of the Organizational Change Inventory designed for use with both military and non military organizations can be obtained from the authors.

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